

## Glenn's new director ready to move forward

### Dr. Earls begins a new era

BY S. JENISE VERIS

Returning from a series of meetings at NASA Headquarters and on Capitol Hill, Dr. Julian Earls conducted his first All Hands Meeting on October 3 and seized the opportunity to state his priorities as Glenn's new Center Director.

"My main priorities are to gain the trust of this Center's employees and to be an advocate for the Center. There was plenty of information given and data reported in the Human Capital Survey and I got the message. Employees must really trust that management is working in their best interest—that's the beginning of making progress."

Earls invited employee questioning on a variety of topics and nodded affirmatively to a comment noting his physical fitness as a marathon athlete and its value in keeping pace with current and future demands on his time. In cases when the new Center Director didn't know the answers to a question, he

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### NASA names new Glenn deputy director

Headquarters news release

Richard S. Christiansen, associate director for Planning at the NASA Dryden Flight Research Center has been named Glenn's new deputy director, effective November 16.



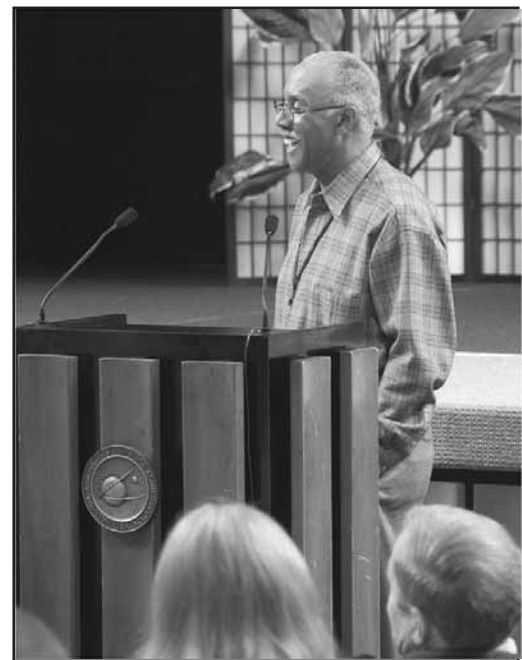
Christiansen

"Rich will be a terrific addition to the Glenn management team," said Frederick Gregory, NASA's deputy administrator.

"He will help us sharpen the cutting edge of technology, strengthen old alliances and develop new ones. He is a highly qualified NASA veteran, familiar with our many research projects, management and resource allocation," Gregory added.

Prior to his assignment to Dryden, Christiansen served as NASA's Aerospace Technology Enterprise director of programs from October 11, 1998 through June 30, 2000. He was responsible for strategic management of all Enterprise programs, planned and conducted for national and Agency goals in aeronautics and space transportation. He has served as a division director or program manager in several organizations since his arrival at NASA Headquarters in 1986. From 1997 to 1998, he served as acting associate administrator of the Aeronautics and Space Transportation Technology Enterprise, for which he received the NASA Outstanding Leadership Medal in 1999.

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C-2003-1616

Photo by Marvin Smith

*Dr. Julian Earls conducted his first All Hands Meeting on October 3 and seized the opportunity to state his priorities as Glenn's new Center Director.*

## Inside

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The first in a series highlighting Glenn's role in Return to Flight activities

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Employees show reverence for those who have served and continue to serve



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Yearlong celebration comes to an exciting close at Kitty Hawk, NC

# Zin named NASA Minority Contractor of the Year

NASA named Zin Technologies, Inc., as Minority Contractor of the Year; Arcata Associates, Inc., as Minority Subcontractor of the Year; and Analytical Services, Inc., as Women Owned Business of the Year. The three firms were honored at the 12<sup>th</sup> Annual Minority Business and Advocates Awards ceremony held September 23 as part of the Agency's Minority Enterprise Development Week.



C-2003-1636

Photo by Marvin Smith

*Zin engineers (left to right, Robert Haley, Kevin DeNdorfer, and Tibor Lorik) refurbish Glenn's Physics of Colloids in Space hardware for return to flight on the space station.*

Zin Technologies, headquartered in Brook Park, OH, is a prime contractor at Glenn for microgravity research and development. Zin operates microgravity science payloads for ground and spaceflight research. The company operates under ISO-certified Quality Management Systems and has partnered with Glenn on more than 95 science payloads since 1990, including 7 of the experiments on STS-107. Zin was one of the first developers operating science payloads on the International Space Station with a continuous presence since April 2001. The firm was recently recognized with the Microgravity Analysis Software Systems team for Glenn's Software of the Year and Northern Ohio Minority Business Council Technology award.

Arcata Associates, Inc., based in North Las Vegas, is a subcontractor to Lockheed Martin and Computer Sciences Corporation. Arcata provides video-and-voice teleconferencing support as well as interactive multimedia and imaging technology services primarily at NASA Marshall.

Analytical Services, Inc. provides program planning and development support services to the Orbital Space Plane Program, which includes technical writing and multimedia design and development for crew rescue from the International Space Station. The company is also supporting management of the design and development of a new multipurpose space transportation system for assured access to space and operational flexibility.



Dr. Kankam

Glenn's **Dr. Mark "Dave" Kankam**, Electrical Systems Development Branch, received the NASA Exceptional Achievement Medal, along with Kennedy's Gloria Marsh and the Jet Propulsion Lab's Bill Padilla, as outstanding advocates within the Agency and for their contributions and innovative approaches to using minority- and women-owned businesses.

In addition, Glenn, Dryden, Headquarters, Langley, Marshall, and the Jet Propulsion Laboratory earned recognition for meeting or exceeding all of their negotiated socioeconomic small business goals for fiscal year 2002.

For more information and a full list of winners, visit the NASA Office of Small and Disadvantaged Business Web site at <http://www.hq.nasa.gov/office/codek/>. ♦

# CIO award given



Farkas

**Les Farkas**, Architecture, Standards and Policies Branch, recently received the NASA Chief Information Officer award for superior technical leadership, exceptional initiative, and innovation

in support of key Agency information technology initiatives. Notable was his dedication and the results accomplished in defining a common NASA Account Management framework for the Agency, which is critical to the Agency's ability to meet existing information technology security requirements and to support future requirements of Federal e-Government initiatives.

## Agency acquisition award presented

Glenn employees who served on the Source Evaluation Committee (SEC) for the Center's Facilities Operations, Repair, and Maintenance contract recently earned a NASA Acquisition Improvement Award for the period January 1 through July 30. The SEC merited the award for new and innovative techniques to submit bids, maintain open communication, ensure propriety, achieve milestones; and minimize protests. Members of the SEC that received the award include Joseph Torri (7300), Mark Manthey (0616), Lynn Irvine (7320), Henry Speier (7601), Brad Kaustinen (7010), Robert Lisy (0611), Jerald Kennemuth (0120), Joseph Powell (8100), and Manuel Dominguez (8300).

**NASA VISION**

**To improve  
life here,**

**To extend  
life to there,**

**To find  
life beyond.**

# NASA women among top aerospace achievers

NASA News Release



Dr. Pérez-Davis

Glenn's Dr. Marla Pérez-Davis, chief of the Electrochemistry Branch, was recently honored with two NASA colleagues, astronaut Barbara Morgan and the Jet Propulsion Laboratory's (JPL) Dr. Andrea Donnellan, during the 18<sup>th</sup> Annual Women in Aerospace (WIA) Award reception in the Rayburn House, Washington, DC.

The three were among five awardees who were selected from hundreds in an open solicitation by the WIA, a Washington-based, nonprofit organization dedicated to promoting the advancement of women and recognizing their outstanding achievements in aerospace and related careers.

Pérez-Davis was the very first recipient of the new Aerospace Awareness Award. This award recognizes an individual's work to build public awareness of aerospace programs and increase public understand-

ing of aerospace development and activities. Pérez-Davis has also served as a role model and mentor to students of diverse backgrounds, races, and nations.

At Glenn, Pérez-Davis manages research and development within the Electrochemistry Branch, including component design, cell fabrication, tests, advanced system conception, and preliminary evaluation related to electrochemical energy conversion and storage. She began her NASA career in 1983.

Morgan received the Aerospace Educator Award for her pioneering work in integrating space research with classroom education. She is NASA's first Educator Astronaut, who is assigned as a crewmember on STS-118. In recognition of her accomplishments and contributions to aerospace science, Donnellan shared WIA's Outstanding Achievement Award with U.S. Air Force Captain Melanie Bean. Donnellan is a geophysicist and serves as the deputy division manager of JPL's Earth and Space Science Division. ♦

## Christiansen, Glenn's deputy director

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Since becoming a member of the Senior Executive Service in 1994, he earned the Presidential Rank of Meritorious Executive in 1998 and again in 2003 for his sustained superior accomplishments in program management.

"I am thrilled Rich agreed to come to Glenn, and I look forward to a close working relationship with him. His reputation, experience, and strong technical and management background will enhance our microgravity, propulsion, communications, and technology research and development programs," said Glenn's Center Director Dr. Julian Earls.

Christiansen's past experiences will assist him in his new role. He has extensive NASA headquarters and field center program-

management experience in the formulation, advocacy, and assessment of basic and focused research and technology programs. He has worked on programs spanning the gamut of research and development from fundamental materials research to flight demonstrations of advanced systems. His experience covers the entire aerospace flight regime from low-speed general aviation to reusable launch systems for low-cost access to space.

"I have worked with many people at Glenn in the past with great success, so I am truly excited about working with all the Glenn team. I am eager to hear all their ideas and to work with Julian to incorporate them into our overall mission," Christiansen said. "I expect to spend a lot of time out of the office talking to people and building good relationships." ♦

## Centaur's 40<sup>th</sup> anniversary

Centaur's brilliant career as the Nation's first high-energy upper-stage launch vehicle started almost 40 years ago on November 27, 1963, with the first demonstration of liquid hydrogen used as rocket fuel.

After undergoing many changes to evolve into "America's Workhorse in Space," Centaur launched 100 unmanned missions during nearly 30 years under Lewis (Glenn) management.

Centaur supported a series of spectacular planetary missions in the 1970's, but was nearly phased out at the beginning of the shuttle era. It is credited with advancing the Nation's quest for knowledge of the universe and facilitating the modern revolution in global communications.

In their soon-to-be released book *Taming Liquid Hydrogen: The Centaur Upper Stage Rocket, 1958-2002*, coauthors Virginia Dawson and Mark Bowles chronicle the unusually long and sometimes controversial career of Centaur, which still flies as the upper stage for the redesigned Lockheed Martin Atlas family of rockets. Published as part of the NASA history series, the book describes the technical and political hurdles that Centaur faced over the three decades that it was managed by Glenn, and argues that taming liquid hydrogen can be considered one of the most significant technical achievements of 20<sup>th</sup>-century American rocketry. ♦

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### Shoe Fund

Valerie McCormack, executive director of Shoes and Clothes for Kids, came to Glenn last month to accept a \$1,500 check from Glenn Shoe Fund committee treasurer Mary Beth Celebrezze (0220) and Center Director Dr. Julian Earls. Glenn's donation will be used to purchase \$10-gift cards from PayLess Shoe Stores for approximately 150 needy children in the Cleveland metropolitan area. This year's campaign brings Glenn's total donation to \$19,900 for the past 9 years. Glenn's Shoe Fund Chairman Ronald Alexander (9000) expressed his appreciation for the generosity demonstrated once again by Glenn staff in contributing to the fund, and for the efforts of Celebrezze and Shoe Fund Secretary Marcia Bellamy (5400).



C-2003-1737

Photo by Marvin Smith

### ACTS 10th anniversary



Ten years to the day after the launch of the Advanced Communications Technology Satellite (ACTS), Glenn employees, retirees, and contractors who made the dream of ACTS a reality, gathered on September 12 to celebrate the 10<sup>th</sup> anniversary of successful on-orbit operations. ACTS was developed as a national research facility to facilitate the development of high-risk, high-cost technology typical of what is now being incorporated into the next generation of communications satellite systems at Ka-band (30/20 GHz). In May 2000, ACTS operations were transitioned to the Ohio Consortium for Advanced Communications Technology, a partnership between the Ohio University, the Ohio Board of Regents, and Glenn. The test satellite now has a new role providing a unique testbed for academia and supporting economic invigoration in Ohio and the Nation. Pictured, left to right, are Frank Gargone, an independent satellite consultant, and former ACTS managers Rodney Knight, Robert Bauer, and Richard Gedney at the anniversary gathering.

### International cooperation



A Glenn delegation including Aeronautics Director Dr. Arun Sehra (2000), George Madzsar (0100), and Laszlo Zala (7310) recently participated in the 3<sup>rd</sup> International Engineering Conference in Győr, Hungary. Their participation reinforced a 2001 NASA-Hungarian Space Agency space cooperative agreement initiated during Zala's tenure as visiting professor at the Budapest University of Technology and Economics. Sehra served as a panel member and presented an overview of NASA's propulsion and power vision for 21<sup>st</sup>-century aviation. The visit also afforded the delegation an opportunity to discuss the status of Budapest University of Technology and Economics student interns planning to do research at OAI in the United States. Pictured at left are Budapest representatives, front to back, Dr. Horvai György, Dr. Ákos Detreköi, Dr. Annamária Várkonyi-Kóczy, and András Tokai. Pictured at right are, front to back, Glenn's Madzsar, Sehra, and Zala.

## News and Events

### City Club



Since Senator John Glenn helped write aviation history as a pilot and astronaut, the City Club of Cleveland invited him to speak on the topic of Centennial of Flight. Glenn served in WWII and the Korean War as a marine pilot, where he flew a total of 149 combat missions and received numerous decorations, including six Distinguished Flying Crosses. Later he joined the Naval Air Test Center's staff of expert flyers, testing naval aircraft before setting a cross-continent speed record, flying from Los Angeles to New York in 3 hours and 23 minutes. On February 20, 1962, Glenn became the first person to orbit the Earth. Following four terms as a U.S. senator, he became the oldest human to return to space as a member of the 1998 Space Shuttle *Discovery* crew. Among Center employees there to cheer him were, left to right, Art Sprungle (retiree/LESA), Paul Greenberg (6711), Senator Glenn, Sandra Nagy (7150), Del Zatroch (7700), Dr. Shantaram Pai (5930), and Albert Juhasz (5430).

## News Notes

**LESA MEETING:** LESA/IFPTE, Local 28, will hold its next monthly membership meeting on Wednesday, November 12, at noon in the

**WOMEN RETIREE LUNCHEON:** The next luncheon for Glenn (Lewis) female retirees is Thursday, November 13, noon, at Donauschwaben's German American Cultural Center, 7370 Columbia Road, Olmsted Township. For further questions and reservations, contact Betty Callaghan, 440-268-9662.

**MAMMOGRAPHY SCREENING:** The Corporate Mammography program is now in progress. Providers are the same as last year, Cleveland Clinic (satellite offices), 216-445-5255, Women's Diagnostic Clinic (Lorain), 440-779-9633; and Women's Diagnostic Center (Severance area), 216-362-8874. Information booklets concerning requirements for all vendors are available in Medical Services. Registration deadline for the Cleveland Clinic is November 10. All other medical facility deadlines are December 31.

**AFGE MEETING:** AFGE Local 2182 will hold its next monthly membership meeting on Wednesday, December 3, at 5 p.m. at Denny's Restaurant, 25912

Lorain Road, North Olmsted. All members are encouraged to attend.

**MENTORS WANTED:** The Office of Educational Programs is once again sponsoring the "Help One Student To Succeed" (HOSTS) educational program at the Douglas MacArthur Elementary School. The program offers an exciting and challenging opportunity for Glenn volunteers to help K-4 students experiencing difficulties in language arts to improve reading proficiency scores and self-esteem. If you are interested in learning more about becoming a HOSTS mentor, please contact Marie Borowski, 216-433-5582.

**MENTORING:** The NASA Center for Distance Learning in cooperation with Christopher Newport University and the Institute of Electrical and Electronic Engineers announce the VINNY award. The award is named in honor of Leonard da Vinci, a man famous for the creative use of science, technology, engineering, and mathematics to solve human problems. The program is designed to help heighten and increase awareness of science, technology, engineering, and mathematics (STEM). VINNY is a global video competition. Teams made up of one teacher and three students will identify and research a global problem and discover

ways that STEM can help solve it. For more information on mentoring opportunities, refer to the Web site at <http://vinny.pcs.cnu.edu>.

## Exchange Corner

- A Peterson's Holiday Nut Sale will be held in the Main Cafeteria on Thursday and Friday, November 13 and 14, from 11 a.m. to 2 p.m. Freshly roasted cashews, pistachios, and mixed nuts are available.
- A Pre-Thanksgiving Day Sale will be held on Monday, November 17, through Friday, November 21, in the Exchange Store. Store hours are 10 a.m. to 2 p.m., Monday through Friday.
- The next "Books Are Fun" Book Fair will be held on Monday and Tuesday, November 17 and 18, in the upper section of the Main Cafeteria from 9 a.m. to 2 p.m.
- The Annual Thanksgiving Dinner Special will be held on Thursday, November 20. Thanksgiving dinner will be served in the Main and DEB cafeterias from 11 a.m. to 2 p.m. Also on Thursday, November 20, Olympia Candies will hold a sale in the Main Cafeteria alcove from 10 a.m. to 2 p.m.



# Glenn team made big impact on shuttle investigation

BY DOREEN ZUDELL

*This is the first in a series of articles highlighting Glenn's significant role in the space shuttle investigation and Return to Flight efforts.*

The same Glenn team who shed light on the probable cause of the Space Shuttle *Columbia* accident is now helping clear the path for NASA's Return to Flight.

Immediately following the accident in February, members of the Ballistic Impact Laboratory were called upon to perform small-scale ballistic testing of the space shuttle external tank foam material and orbiter wing leading edge reinforced carbon-carbon material, according to Dale Hopkins, Structural Mechanics and Dynamics Branch.

"Our role was to validate large-scale testing to be done at the Southwest Research Institute in San Antonio, TX, and provide data used to calibrate models for computer-based simulations for large-scale and actual orbiter vehicle impact," said Hopkins, technical leader of the team. Structural Mechanics and Dynamics Branch members Jeff Hammel (AKIMA), Dr. Mike Pereira, and Duane Revilock performed the testing.

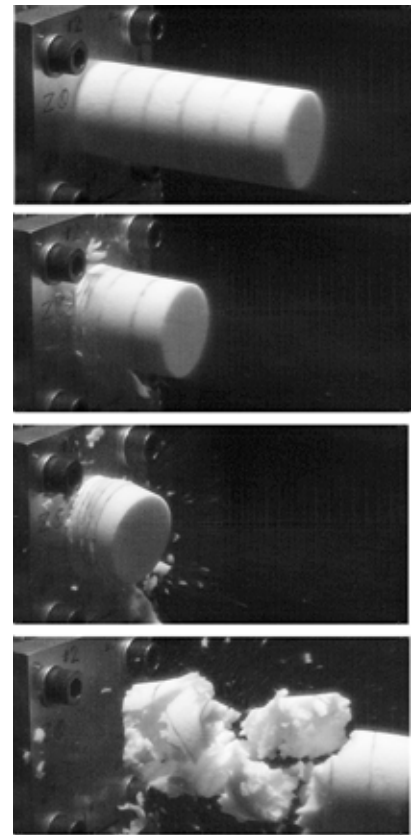
The Ballistic Impact Laboratory constructed a unique gas gun for the

shuttle investigation—having its barrel mounted to shoot into a vacuum chamber—enabling impact tests at low-pressure, low-temperature conditions. This capability was critical because the facility could simulate environmental conditions experienced by the shuttle during its launch.

Over a period of 3 months, the team worked at modifying the facility to accommodate the tests, performing the tests, and acquiring data. Additionally, Dr. Kelly Carney and Matt Melis, Structural Mechanics and Dynamics Branch, worked over a period of 5 months developing models and performing computer simulations.

"The extensive testing and computer simulations were aimed at predicting what happened during the actual event and to determine if the proposed large-scale testing in San Antonio would be valid," Hopkins said. "Consequently, the large-scale tests determined the probable cause of the accident, foam debris impact on leading edge panel number 8."

Throughout the intense months of testing, the ballistic impact team relied greatly on the support of various areas throughout the Center, such as



*High-speed digital imagery captures an impact test of external tank foam hitting a load cell at 800 feet per second.*

the Engineering Directorate and the Logistics and Technical Information Division, especially the Imaging Technology Center.

Investing a high degree of confidence in the capabilities of Glenn's ballistic impact team, the Agency continues to call upon the team to assist in NASA's Return to Flight efforts. With additional upgrades to the facility, the team has been asked to perform testing of external tank materials and other potential debris that could threaten the orbiter vehicle thermal protection systems and windows.

"It's been fulfilling for our team to have such a key role in the investigation and to come through for the Agency at such a difficult time. We stepped up and delivered," Hopkins said. "We look forward to continuing to make a significant impact." ♦

C-2003-1749

Photo by Marvin Smith



*Associate Administrator, Office of Space Flight, William Readdy (left) and Associate Deputy Administrator for Technology Programs Dr. Michael Greenfield (right) recently visited the Center to learn of Glenn's involvement in the STS-107 experiments, accident investigation, and Return to Flight efforts. They are pictured with Glenn's Duane Revilock and Mike Pereira (center) discussing the impact behavior of external tank foam samples at the vacuum gun facility of the Ballistic Impact Lab.*



## Veterans Day, November 11

# Building sends special delivery of love

BY DOREEN B. ZUDELL

Members of the Akron-based 447<sup>th</sup> Military Police Company stationed in Iraq feel a little closer to home, thanks to building residents, who took up a collection to purchase and send supplies to the troops.

Many items Center employees take for granted, such as pencils, envelopes, and tea bags, are not easily available to the troops, explained Diane Benton, Avionics, Power and Communications Branch, whose future son-in-law, Jeremy Stephens, serves in the 447<sup>th</sup> unit. So Benton and officemate Alicia Camburako spearheaded a bagel and donut fundraiser in their building to supply some of the much-needed items.

"We were overwhelmed by the response of our coworkers," Benton said. "Between the fundraiser and additional individual donations, we raised \$600, which we used to purchase and send 13 boxes of supplies to the company."

Among the items requested by the troops and sent within the boxes were cookies, fruit cups, olives, raisins, nasal spray, lip balm, dental floss, batteries, and baby wipes, to name just a few. To add a NASA flavor to the care packages,



*Some of the members of the Akron-based 447th Military Police Company stand proudly by the Ohio Bicentennial flag, which was sent in a care package from Glenn.*

the ladies purchased space food ice cream and included it in individual care bags that contained other fun NASA paraphernalia.

John Miller, Avionics, Power and Communications Branch, reinforced the local connection by sending an Ohio Bicentennial Flag, which he obtained free from the *Elyria Chronicle Telegram* newspaper. Laminated messages of support to the soldiers from building residents were also enclosed in the packages.

"For us at home, it seems like there is so little we can do for our troops," Camburako said. "This is a way for us to

reach out to them and show them that they are loved and not forgotten." ♦

## Shining examples

Just like the Fourth of July and Memorial Day, Veterans Day offers the opportunity to celebrate and practice a different set of the three R's: *recognize, remember, and reflect* on the men and women in the Armed Forces who have put their lives in harm's way to protect our freedom.

The Veterans Advisory Committee (VAC) has erected The Wall of Honor in the Sharp Employee Center, Building , as a *daily* reminder of the coworkers and relatives of Glenn employees currently serving with pride. Although you may not know them, they represent all of us, and they need our support.

"Those names and faces on the wall are a picture of America—people from all walks of life and cultures dedicated to protecting our country and defending our freedom, values, and our way of life," said Bill Saettel, VAC member. "Their sacrifice and efforts should not be forgotten. The wall is a symbol of the American spirit, and honors those who keep us free." ♦

## POW-MIA recognition



Photo by Doreen Zudell

Maynard "Doc" Unger, a former World War II prisoner of war, gave the keynote address at this year's POW-MIA recognition ceremony on September 19. Unger is pictured with the Lewis Little Folks kindergarten class, who participated in the recognition.

# Glenn colleagues honored for Space Flight Awareness

Dr. Lois Scaglione, Todd Tofil, and Jeffrey Woytach of Glenn were among the Space Flight Awareness (SFA) honorees

recognized during a reception held at the Smithsonian Institution's National Air and Space Museum on September

## Hispanic Heritage Month

## Giving enables success

BY S. JENISE VERIS

In one of his last appearances as Center Director, Donald Campbell acknowledged the Hispanic workforce in his welcoming remarks at Glenn's Hispanic Heritage Month celebration held September 25. "Individually and collectively, the Hispanic community has made significant contributions to help Glenn and the Agency meet mission goals," he affirmed.

This year's Hispanic Heritage Month theme, "Hispanics: Honoring our Past, Surpassing our Present, and Leading our Future," reflects the Hispanic community's desire to exceed past achievements. These same sentiments were echoed in the presentation by Jimmy Cabrera, motivational speaker and president of the training and consulting firm Success Through Excellence, Inc., in Houston, TX.

Committed to the philosophy that you don't count what you've received, but what you have given to measure your success, Cabrera challenged Glenn employees and guests to "find your *niche* to avoid a potential *ditch*." He outlined steps for finding your **NICHE**

and setting the example for your children by starting **N**ow to take advantage of training and skill development, which builds self-esteem and enables an **I** can attitude and **C**onfidence that you can make a difference. And then, be willing to **H**elp and encourage the talents of others despite differences to **E**nable everyone to become effective, efficient, and excellent as they can be.

The colorful Ballet Folklorico Tepehuani Nelli performed two dance selections during the event, which was cosponsored by the Hispanic Advisory Council and Office of Equal Opportunity Programs. After the program, the audience was invited to sample a variety of Hispanic pastry.

Later that afternoon, Glenn sponsored Cabrera's visit to Cleveland's Joseph M. Gallagher Middle School where Cabrera shared his message with 300 students participating in Cuyahoga Community College's GEAR UP (Gaining Early Awareness and Readiness for Undergraduate Program). ♦

C-2003-1575



C-2003-1584

*Dance members of the Ballet Folklorico Tepehuani Nelli performed one of two cultural dances during the heritage program.*

*The audience joined Cabrera in an exercise of attitude adjustment using their fingers: "If it is to be, it must start with me!"*

Photos by Marvin Smith



Dr. Scaglione



Tofil

25. This year's 40<sup>th</sup> SFA anniversary celebrated the contributions of the dedicated men and women of our space program, with special guests Administrator Sean O'Keefe, Associate Administrator for Space Flight William F. Readdy, and STS-114 Commander Eileen M. Collins.



Woytach

**Dr. Scaglione**, Risk Management Office, was recognized for her outstanding leadership supporting the Columbia Accident Investigation Board's use of the Process Based Mission Assurance (PBMA) Knowledge Management System to post electronic pictures, documents, and other critical items used in their investigation. Scaglione's efforts significantly contributed to the selection of PBMA as recipient of the 2003 e-Government Award.

**Todd Tofil**, Experiment Systems and Controls Branch, was recognized for his sustained superior technical and leadership excellence in the Microgravity Flight Program. He developed and was a key contributor to successful gas can, glovebox, middeck locker, and Spacelab payloads.

**Jeffrey Woytach**, Space Flight Project Branch, was recognized for his expertise in flight qualification and safety integration processing of shuttle payloads. He was also honored for his leadership in the flight of the circuit isolation device and the floating potential probe, both used on the International Space Station. ♦



# Earls addressed employee concerns

Continued from page 1

promised to get the answers quickly; and equally committed to sharing both good and bad news with the workforce as an indication of his desire to build trust.

During the meeting, Earls addressed management and employee concerns that affect everyone across the board, saying that Center leadership will develop a long-term strategy to retain skilled employees and to develop employee skills and competencies. He said that he will ask the Center management to examine the impact of workplace rules on the Center's performance and emphasized management's role in building trust to move forward. He also expressed support for the Center's unions and their vital role in bringing dissenting opinions to Center management.

The new Center Director conveyed an urgency to strengthen relationships within local and regional political and business communities to maintain support for Glenn over the long haul. He shared recent efforts and some on the horizon.

- A planned meeting with the Governor before the November election
- A meeting with the Ohio Aerospace Council about recommendations to make Glenn an "engine for economic development," and establishment of subteams to address the recommendations
- A meeting with the Cleveland Growth Association to initiate plans for a NASA Technology Showcase to highlight Glenn accomplishments in partnership with local businesses
- A meeting with Cuyahoga County Commissioners about a "Glenn presence" in various exhibits around the County
- Plans to establish regular exchange meetings with Wright Laboratory staff and request their participation in the Technology Showcase
- Plans for Glenn to submit a proposal, in concert with the community, for locating the NASA Shared Services Center in Greater Cleveland

Earls also stressed the need for all employees to understand the value of media and the importance of positive

information about our Center and employees' community service.

"I recognize and appreciate that many of you are already involved in your communities as mentors, serving on church or school boards, advisory groups, etc. These things are not taken for granted," Earls said. "However, as competent as we are at what we do, we still must be able to interact and communicate with people outside the gate as if we are all ambassadors for Glenn."

While he was not prepared to make an announcement about any specific plans for reorganization, Earls affirmed that he

had discussed some preliminary plans to become more efficient and effective with Administrator O'Keefe and Dr. Victor Lebacqz, acting associate administrator for the Office of Aerospace Technology. He promised to give more details soon. Meanwhile, he requested patience as he makes every effort to do the right things for the right reasons.

"I don't come into this position thinking that I know all the answers or very many answers," he confessed. "I really believe that the key to my success and our ability to achieve these goals lies in choosing good people and allowing them to do what they have been charged to do." ♦

## PBS decommissioning update

NASA had good news to share with its Erie County neighbors last month at its fifth annual Community Information Session (CIS) on the decommissioning of the Plum Brook Station (PBS) Reactor Facility. The CIS was held at Sandusky High School, where area residents heard about the progress being made on removal of the reactor internals and segmentation.

The CIS also included a preview of a video documentary that will be released this month on the 1962 to 1973 history of the PBS Reactor Facility—the only one ever built by NASA.

Decommissioning Project Manager Tim Polich noted, "We welcomed the opportunity to share with our neighbors the significant progress we have made."

Segmentation began in August when crews removed three horizontal beam tubes that ran through the side of the reactor vessel wall and into the core box. This material was then successfully shipped to the Barnwell licensed disposal site in Aiken, SC. NASA also informed residents about several shipments of waste to the Alaron licensed waste reprocessing facility in Pennsylvania and that weekly shipments are anticipated for the near future.

While much of the process has been inside the Reactor Facility, last month the Reactor Facility water tower was also removed. Segmentation is scheduled to run into 2004, with work currently proceeding on removal of internals at the core region and the removal of beryllium plates, using specialized clamps and an immobilization process to prevent cracking. ♦

*A crew from Wachs Technical Services works on a mock-up of a horizontal beam tube during training for PBS Reactor Facility segmentation.*





Charleston



González-Sanabria



Dr. Bailey



Dr. Landis

## ATHENA award

**Jo Ann Charleston**, chief of Glenn's Educational Programs Office, was recently honored with a 2003 ATHENA award presented by Cleveland's *Inside Business* magazine in partnership with Akron's ATHENA Foundation. The ATHENA Award programs recognize individuals on the local, national, and international level for their professional excellence, community service, and assistance in helping women to attain their full leadership potential.

## Hall of Fame

**Olga D. González-Sanabria**, director, Systems Management Office, and **Dr. Sheila Bailey**, senior physicist in the Photovoltaic and Space Environments Branch, joined nine other women inducted into the 2003 Ohio Women's Hall of Fame. Governor Taft and First Lady Hope Taft hosted the 25<sup>th</sup> annual induction ceremony at the Ohio Statehouse on October 7.

The Ohio Women's Hall of Fame was established in 1978 to create public recognition for the outstanding contributions Ohio women made to their state, the Nation, and the world. Its members come from all walks of life, but each has demonstrated an extraordinary commitment to excellence, achievement, and service to others.

González-Sanabria was lauded for technical contributions including Long Cycle-Life Nickel-Hydrogen Batteries, used to power International Space Station power system, which earned her an



Dr. Lytle



Zala

*R&D 100* award. She is the only female member on the Center's Strategic Management Team and Glenn's first Hispanic female to achieve the rank of Senior Executive.

Bailey was recognized for her pioneering work as technical lead in Quantum Dot Solar Cell technology for Advanced Concepts in the Power and On-Board Propulsion Technology Division. Bailey has authored or coauthored over 114 journal and conference publications and five book chapters. She will be the General Chair of the 4<sup>th</sup> World Conference in Photovoltaic Energy Conversion in 2006.

## Hugo Award

**Dr. Geoffrey Landis**, Photovoltaic and Space Environments Branch, has received the prestigious Hugo Award in the category of Best Short Story of the Year for his "Falling onto Mars." The award is determined by popular vote from members of the World Science Fiction Society and presented at the Society's annual convention, held this year in Toronto, Canada. Landis was a 1992 winner in the same category for his short story, "A Walk in the Sun."

## AIAA award

**Dr. John Lytle**, chief of the Computing and Interdisciplinary Systems Office, recently received the American Institute of Aeronautics and Astronautics (AIAA) 2003 Information Systems Award for his outstanding leadership in developing advanced software that dramatically improves productivity in design of propulsion systems for military and civil applications. Lytle accepted the award, which included an engraved bronze medal, a certificate of citation, and a rosette pin, during the AIAA's Digital Avionics Conference awards luncheon held October 15.

## Engineering honors

**Laszlo Zala**, Facilities Engineering and Architectural Branch, was the recipient of several awards recognizing his leadership and contributions to the field of engineering: honorary membership in the University Senate at the Budapest University of Technology and Economics, the institution's second highest honor; induction into the Academy of Electrical and Computer Engineering at the University of Missouri-Rolla for his leadership and contributions to the profession of electrical engineering; and the International Energy Manager Award from the Association of Energy Engineers.

*AeroSpace Frontiers* is an official publication of Glenn Research Center, National Aeronautics and Space Administration. It is published the first Friday of each month by the Community and Media Relations Office in the interest of the Glenn workforce, retirees, government officials, business leaders, and the general public. Its circulation is approximately 6700.

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**DEADLINES:** News items and brief announcements for publication in the December issue must be received by noon, November 14. The deadline for the January issue is noon, December 12. Submit contributions to the editor via e-mail, [doreen.zudell@grc.nasa.gov](mailto:doreen.zudell@grc.nasa.gov), fax 216-433-8143, phone 216-433-5317 or 216-433-2888, or . Ideas for news stories are welcome but will be published as space allows. View us online at <http://AeroSpaceFrontiers.grc.nasa.gov>.



## In Appreciation

I wish to extend my sincere gratitude to those of you who offered concern and prayers during my father's hospitalization and passing. Thank you for all of the flowers and for the donations made to the American Diabetes Association in my father's memory. Your thoughtfulness and kindness are truly appreciated during this difficult time.

—Deanna Gullett

## In Memory

**Richard Golladay**, 82, who retired from Glenn with 35 years of service, recently died. Golladay served as a mechanical engineer in the Facilities, Test and Experiment Division where he supported advanced subsonic technology performed in the High-



Golladay

Altitude Wind Tunnel. He is survived by his wife Norma, a former Center employee who was a "computer" for the Compressor and Turbine Building, and daughter Susan Fox (ACS), who currently supports Glenn's Information Systems Division as an ODIN administrator.

**Walter E. Russell**, who recently died at the age of 79, was a former chief of the Fabrication Division. During his career at NASA, Russell earned numerous awards including a NASA Honor Award for Outstanding Leadership. He also participated in the golf league. He retired in 1981 after 29 years of Federal service, which included time in the armed services during WWII.

**CORRECTION:** **William Harris**, 77, who retired in 1994 with 33 years of Federal service, recently died. While at Glenn, he worked as a plumber and pipefitter.



For announcements on weather or emergency closings of the Center call (216) 433-WEAT.

## Behind the Badge

a closer look at our colleagues

**Dr. Minna Chao**



Sword and Wudang Taiji Sword.

**Job Assignment:** Computer scientist in the Computational Sciences Branch, Information Systems Division.

**Time at NASA:** I joined NASA in 1985.

**Hobbies/interests outside of NASA:** I'm a Chinese martial artist. I won two gold medals in the US National Chinese Martial Arts Championships at Pittsburgh, PA, on August 10. I earned titles in the External Classical and the Internal Traditional Divisions. A reporter from the *Cleveland Plain Dealer* interviewed me and published an article featuring me on August 30. The response was overwhelming. Overnight I became a well-known person in my little world. People are so kind, nice, and warm to me. I am pleased, honored, and blessed. My favorite wushu routines are Qing Ping

**Vacation fantasy:** Wudang Mountain, located in the heart of Hubei Province in China is where the Wudang Jian sword techniques was created. Seen in the movie *Crouching Tiger, Hidden Dragon*, Wudang Mountain is China's most cherished martial arts treasure. This is a famous place for Taoism and believed to be the birthplace of Tai Chi Chuan (also known as Taijiquan). According to Chinese Legend, Tai Chi Chuan was created by an ancient Wudang master named Zhang San Feng. This routine was inspired by mystical visions, which Zhang San Feng experienced on that mountain. After I saw the movie, my dream vacation has been to visit Wudang Mountain to experience its mystical beauty.

**Stress buster:** There are many benefits of practicing Tai Chi Chuan. Some of them are to strengthen the body, to prevent and cure illness, to reduce stress, to prolong life, and to improve quality of life. Tai Chi Chuan can also be used for competition, performance, recreation, and self-defense. It's the safest exercise suitable for all age groups and can be practiced any where and at any time. With just 30 minutes of daily practice, you can expect to reap these benefits. In many Asian countries, millions of people practice Tai Chi Chuan as part of their daily health regimen. Now hundreds of thousands of Americans are trying it.

**Favorite Web site:** [http://www.geocities.com/mmchao888/taiji\\_GraceoftheBlade.htm](http://www.geocities.com/mmchao888/taiji_GraceoftheBlade.htm).

**AeroSpace Frontiers** is adding some spice to its "Behind the Badge" column by offering more question options and focusing on the unique aspects of Glenn employees. If you or someone you know has a hobby or interest (in or outside of the workplace) that might be featured in this column, please contact us at 216-433-5317 or [Doreen.Zudell@crc.nasa.gov](mailto:Doreen.Zudell@crc.nasa.gov).



# Centennial celebration culminates at Kitty Hawk

BY DOREEN B. ZUDELL

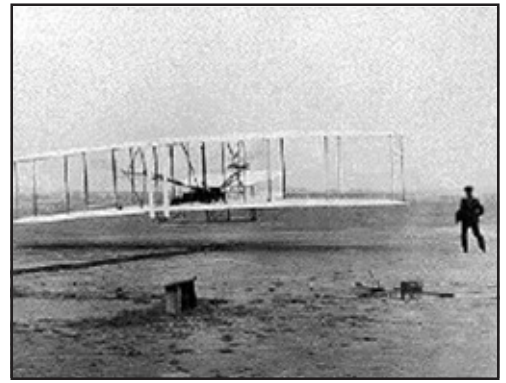
Few moments in history capture the essence of the American spirit like the Wright Brothers' historic flight at Kitty Hawk, NC. From December 12 to 17, the yearlong centennial of flight concludes with the First Flight Centennial Celebration on the same revered sand dunes that witnessed the first flight 100 years ago.

The centerpiece of the celebration is the daring flight of the 1903 Wright Flyer replica—the only accurate flying reproduction of the original—at Kill Devil Hills, N.C. Pilots Terry Queijo and Kevin Kochersberger are following in the footsteps of the Wrights by training in a Wright glider. On December 17, at the toss of a coin, one of them will win the opportunity for the first of two attempted recreations, and lie down across the lower wing and attempt to duplicate the same miracle achieved 100 years ago. Somewhat different is the fact that both genders are represented in this coin toss, so women pilots will be equally represented.

The celebration will also feature special programs, events, exhibits, shows, and festivals that highlight the Nation's aviation heritage. NASA is an important part of this historic celebration through educational activities and displays. The International Space Station trailer, the Space Shuttle Main Engine, and Glenn's Mobile Aeronautics Education Laboratory are among the exhibits that will showcase NASA's technological achievements in aviation and space.

In addition, the Glenn-managed and staffed "Powering Flights, Powering Dreams..." exhibit, which drew record crowds at the L.A. County Fair in September, will make its final stop at Kitty Hawk on the Centennial of Flight tour.

"This capstone Centennial of Flight event is a fitting climax to a yearlong celebration recognizing two Ohio inventors whose dream and resolve made NASA possible," said Glenn's Centennial of Flight Project Manager Susan Hennie,



*The Centennial of Flight concludes with the First Flight Centennial Celebration on the same sand dunes that witnessed the first flight 100 years ago.*

Research and Technology Directorate. "We consider the Wright Brothers to be the founding fathers of NASA. We hope to see many current and former employees at the nearly sold out event—to witness the reenactment and to celebrate the birth of aviation at the grounds considered sacred for aviation enthusiasts."

Visitor access to the Wright Brothers National Memorial, Kitty Hawk, NC, during the First Flight Centennial Celebration is limited to those holding tickets (children under 12 are free). Visitors must purchase tickets prior to arrival to the park. For details on purchasing tickets, visit [www.wrightbrothers.reserveworld.com](http://www.wrightbrothers.reserveworld.com) or call toll free 800-973-7327. ♦

National Aeronautics and  
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